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| **Naval Air Station Brunswick** | **)** | **Departmental** |
| **Cumberland County** | **)** | **Findings of Fact and Order** |
| **Brunswick, Maine** | **)** | **Air Emission License** |
| **A-268-71-T-A/R** | **)** | |

After review of the air emissions license amendment/renewal application, staff investigation reports and other documents in the applicant's file in the Bureau of Air Quality, pursuant to 38 M.R.S.A., Section 344 and Section 590, the Department finds the following facts:

## I. REGISTRATION

A. Introduction

The Naval Air Station Brunswick (NASB) of Brunswick, Maine has applied to renew their Air Emission License permitting the operation of emission sources associated with their military flight operations facility.

NASB has also requested an amendment to the license to incorporate the replacement of one generator and the addition of a small spare generator.

B. Emission Equipment

NASB is authorized to operate the following equipment:

**Table I: Fuel Burning Equipment**

| Equipment | Maximum Capacity (MMBtu/hr) | Maximum Firing Rate (gal/hr) | Fuel Type, % sulfur | Stack # |
|---|---|---|---|---|
| **Hangar 1** | | | | |
| Boiler #1 | 5.5 | 39 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 12 |
| Boiler #2 | 5.5 | 39 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 12 |
| Boiler #3 | 5.5 | 39 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 12 |
| **Hangar 3** | | | | |
| Boiler #1 | 5.25 | 37 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 13 |
| Boiler #2 | 5.25 | 37 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 13 |
| Boiler #3 | 5.25 | 37 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 13 |

| | | | | |
|---|---|---|---|---|
| **Bldg. 86** | | | | |
| Boiler #1 | 3.0 | 21 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 14 |
| Boiler #2 | 3.0 | 21 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 14 |
| Boiler #3 | 3.0 | 21 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 14 |
| **Bldg. 250** | | | | |
| Boiler #1 | 6.0 | 43 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 15 |
| Boiler #2 | 6.0 | 43 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 15 |
| Boiler #3 | 6.0 | 43 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 15 |
| Make-up air | 2.75 | 30 | Propane &/or natural gas | - |
| **Bldg. 211*** | | | | |
| Boiler #3 | 5.5 | 39.2 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 1 |
| Boiler #4 | 6.2 | 44 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 16 |
| Boiler #5 | 6.2 | 44 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 16 |
| **Bldg. 594** | | | | |
| Boiler #1 | 1.5 | 15 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 7 |
| Boiler #2 | 1.5 | 15 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 7 |
| **Bldg. 516** | 1.6 | 11.3 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 8 |
| **Bldg. 54** | 2.2 | 24.5 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 9 |
| **Bldg. 645** | 1.7 | 17.4 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 10 |

| | | | | |
|---|---|---|---|---|
| **Hangar 5** | | | | |
| Boiler #1 | 4.25 | 35.7 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 11 |
| Boiler #2 | 4.25 | 35.7 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 11 |
| Boiler #3 | 4.25 | 35.7 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 11 |
| Boiler #4 | 4.25 | 35.7 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 11 |
| **Bldg. 512** | | | | |
| Boiler #1 | 1.3 | 8.7 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 6 |
| Boiler #2 | 1.25 | 12.6 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 6 |
| Boiler #3 | 1.25 | 12.6 | #2 fuel oil, #1 kerosene, &/or natural gas; 0.5% | 6 |

*: boilers #3, #4 and #5 in building 211 may fire specification waste oil with a maximum sulfur content not to exceed 0.5% by weight
note: propane is used for initial firing of all licensed boilers

**Table II: Electrical Generation Equipment**

| **Equipment** | **Power Output (kW)** | **Firing Rate (gal/hr)** | **Fuel Type, % sulfur*** |
|---|---|---|---|
| **Bldg. 233** Engine #14 | 900 | 61.5 | Diesel &/or #2 oil; 0.5% |
| **Hangar 5** Engine #3 | 155 | 11.4 | Diesel; 0.05% |
| **Bldg. 86** Engine #31 | 80 | 6.0 | Diesel; 0.05% |
| **Bldg. 200** Engine #4 | 230 | 15.0 | Diesel; 0.05% |
| **Bldg. 209*** Engine #45 | 200 | 14.4 | Diesel; 0.05% |
| **Bldg. 211** Engine #9 | 65 | 5.3 | Diesel; 0.05% |
| **Bldg. 292** Engine #5 (or #42) | 125 | 9.3 | Diesel; 0.05% |

| | | | |
|---|---|---|---|
| **Bldg. 225**<br>Engine #38 (spare) | 125 | 9.3 | Diesel; 0.05% |
| **Bldg. 295 fire pumps** | | | |
| Engine #18-1 | 287 | 20.0 | Diesel; 0.05% |
| Engine #18-2 | 287 | 20.0 | Diesel; 0.05% |
| Engine #18-3 | 287 | 20.0 | Diesel; 0.05% |
| Engine #18-4 | 287 | 20.0 | Diesel; 0.05% |
| **Bldg. 594** | | | |
| Engine #26 | 300 | 21.1 | Diesel; 0.05% |
| Engine #27 | 230 | 16.4 | Diesel; 0.05% |
| **Bldg. 645**<br>Engine #29 | 275 | 19.4 | Diesel; 0.05% |
| **Bldg. 646**<br>Engine #30 | 100 | 7.7 | Diesel; 0.05% |
| **Bldg. 654**<br>Engine #32 | 125 | 8.0 | Diesel; 0.05% |
| **In storage****<br>Engine #44 | 60 | 4.3 | Diesel; 0.05% |

*: denotes a new generator being installed to replace the existing unit which was also rated at 200 kW.

**: denotes new equipment to be added to the license.

**Table III: Process Equipment**

| **Equipment** | **Location** |
|---|---|
| Storage Tanks | bldg. 650, 651 and various |
| Fuel Dispensing | bldg. 117, 538, 39 |
| Deicing Operations | aircraft and runway |
| Degreasers | various |
| Painting Operations | bldg. 86, 51, 250 |
| Jet Engine Test Cells | bldg. 611 |
| Misc. Fugitive Emissions | various |

***Note:*** ***NASB also operates several insignificant sources. A list of these sources can be found in the application for renewal submitted to the Department on December 6, 1999 or in a letter to the Department dated August 31, 1999.***

C. Application Classification

The application for NASB does not include the licensing of increased emissions or the installation of new or modified equipment. Therefore, the license is considered to be a renewal of current licensed emission units only.

## II. BEST PRACTICAL TREATMENT (BPT)

A. Introduction

In order to receive a license the applicant must control emissions from each unit to a level considered by the Department to represent Best Practical Treatment (BPT), as defined in Chapter 100 of the Air Regulations. Separate control requirement categories exist for new and existing equipment as well as for those sources located in designated non-attainment areas.

BPT for existing emissions equipment means that method which controls or reduces emissions to the lowest possible level considering:

- the existing state of technology;
- the effectiveness of available alternatives for reducing emissions from the source being considered; and
- the economic feasibility for the type of establishment involved.

B. Fuel Burning Equipment

NASB operates 27 licensed boilers for facility heating an hot water demands (in addition to several units that are below the threshold for licensing). A complete list of these units can be found above in Table I. NASB has recently undergone facility decentralization and has decommissioned the large boilers in building 233 and is therefore not requesting that these units be relicensed. Due to the size of each of these boilers none are subject to EPA New Source Performance Standards (NSPS) Subpart Dc. Each of these units is limited to firing #2 fuel oil, #1 kerosene and/or natural gas, none of which may exceed a sulfur content of 0.5% by weight.

C. Electrical Generation Equipment

NASB operates 18 stand-by diesel engines for back-up power in case of a circumstance in which the base loses power (in addition to several units that are below the threshold for licensing). A complete list of the licensed units can be found above in Table II. With the exception of engine #14 all units are limited to the firing of low sulfur diesel fuel with a maximum sulfur content not to exceed 0.05% by weight. Building 233Engine #14 is limited to firing low sulfur diesel fuel or fuel oil with a sulfur content of no greater than 0.5% due to an existing common fuel supply.

D. Process Equipment

1. Storage Tanks
   NASB operates several above ground storage tanks for the storage of various petroleum products and other substances that require bulk storage. Of these storage tanks there are two tanks referred to as JFSI/1 and JFSI/2 that store large quantities of JP-8. NASB maintains records of all non-exempt storage tanks and the throughput for each.
2. Fuel Dispensing Operations
   Buildings 117, 538 and 39 are equipped with gasoline dispensing equipment for the facility. NASB maintains records of all product dispensed and delivered on a monthly basis. Building 538 is equipped with Stage I and II controls to meet the requirements of Chapter 118. Building 117 is equipped with a Stage I vapor balance system to meet the requirements of Department Regulations Chapter 118 and further controlled by Stage II control equipment.
3. Deicing Operations
   Due to the flight operations conducted at NASB aircraft must be maintained in operable status. During inclement weather crews must often deice the aircraft before take-off using propylene glycol. NASB maintains records of all propylene glycol usage by squadron on a monthly basis.
4. Degreasers
   NASB operates various degreasing units throughout the facility that are subject to the requirements of Chapter 130. NASB maintains records of solvent added and removed on a monthly basis.
5. Painting Operations
   NASB conducts a multitude of painting operations throughout the facility. However, there are five (5) booths in operation that conduct a majority of the parts coating operations for the facility. These booths are located in buildings 86 and three (3) in building 250, the building 51 unit is not currently in operation. Each booth is equipped with high efficiency filters to control emissions. NASB maintains records of hours of operation, material and usage amount along with VOC content (as documented by MSDS sheets) per month for each of these units to document the quantity of VOC emissions.
6. Jet Engine Test Cells
   NASB operates two engine test cells, a small APU unit and a larger T-56 unit. NASB maintains records of usage for each unit.
7. Misc. Fugitive Emissions
   There are various miscellaneous fugitive emissions emitted from work conducted at squadron locations throughout the facility. NASB maintains records for these activities documenting the activity, location and usage on a monthly basis. NASB shall continue to maintain such records for each activity not listed in Chapter 115, Appendix B, as well as those activities with a potential to emit greater than one (1) ton per year of any regulated pollutant.

E. Annual Emission Restrictions
NASB shall be restricted to the following annual emissions, based on a 12 month rolling total:

| **Pollutant** | **Tons/Year** |
|---|---|
| PM | 20.0 |
| $PM_{10}$ | 20.0 |
| $SO_2$ | 94.0 |
| $NO_x$ | 73.0 |
| CO | 15.0 |
| VOC | 48.0 |

## III. AMBIENT AIR QUALITY ANALYSIS

According to the Maine Regulations Chapter 115, the level of air quality analyses required for a renewal source shall be determined on a case-by case basis. Modeling and monitoring are not required for a renewal if the total emissions of any pollutant released do not exceed the following:

| **Pollutant** | **Tons/Year** |
|---|---|
| PM | 50 |
| $PM_{10}$ | 25 |
| $SO_2$ | 50 |
| $NO_x$ | 100 |
| CO | 250 |

Based on a modeling analysis completed in February of 1999 for the decentralization project, it has been determined that based on current configuration and operation NASB will not violate MAAQS.

## ORDER

Based on the above Findings and subject to conditions listed below, the Department concludes that the emissions from this source:

- will receive Best Practical Treatment,
- will not violate applicable emission standards,
- will not violate applicable ambient air quality standards in conjunction with emissions from other sources.

The Department hereby grants Air Emission License A-268-71-T-R subject to the following conditions:

(1) Employees and authorized representatives of the Department shall be allowed access to the licensee's premises during business hours, or any time during which any emissions units are in operation, and at such other times as the Department deems necessary for the purpose of performing tests, collecting samples, conducting inspections, or examining and copying records relating to emissions.

(2) The licensee shall acquire a new or amended air emission license prior to commencing construction of a modification, unless specifically provided for in Chapter 115.

(3) Approval to construct shall become invalid if the source has not commenced construction within eighteen (18) months after receipt of such approval or if construction is discontinued for a period of eighteen (18) months or more. The Department may extend this time period upon a satisfactory showing that an extension is justified, but may condition such extension upon a review of either the control technology analysis or the ambient air quality standards analysis, or both.

(4) The licensee shall establish and maintain a continuing program of best management practices for suppression of fugitive particulate matter during any period of construction, reconstruction, or operation which may result in fugitive dust, and shall submit a description of the program to the Department upon request.

(5) The licensee shall pay the annual air emission license fee to the Department, calculated pursuant to Title 38 M.R.S.A. § 353.

(6) The license does not convey any property rights of any sort, or any exclusive privilege.

(7) The licensee shall maintain and operate all emission units and air pollution systems required by the air emission license in a manner consistent with good air pollution control practice for minimizing emissions.

(8) The licensee shall maintain sufficient records to accurately document compliance with emission standards and license conditions and shall maintain such records for a minimum of six (6) years. The records shall be submitted to the Department upon written request.

(9) The licensee shall comply with all terms and conditions of the air emission license. The filing of an appeal by the licensee, the notification of planned changes or anticipated noncompliance by the licensee, or the filing of an application by the licensee for a renewal of a license or amendment shall not stay any condition of the license.

(10) The licensee may not use as a defense in an enforcement action that the disruption, cessation, or reduction of licensed operations would have been necessary in order to maintain compliance with the conditions of the air emission license.

(11) In accordance with the Department's air emission compliance test protocol and 40 CFR Part 60 or other method approved or required by the Department, the licensee shall:

(i) perform stack testing to demonstrate compliance with the applicable emission standards under circumstances representative of the facility's normal process and operating conditions:

a. within sixty (60) calendar days of receipt of a notification to test from the Department or EPA, if visible emissions, equipment operating parameters, staff inspection, air monitoring or other cause indicate to the Department that equipment may be operating out of compliance with emission standards or license conditions; or

b. pursuant to any other requirement of this license to perform stack testing.

(ii) install or make provisions to install test ports that meet the criteria of 40 CFR Part 60, Appendix A, and test platforms, if necessary, and other accommodations necessary to allow emission testing; and

(iii) submit a written report to the Department within thirty (30) days from date of test completion.

(12) If the results of a stack test performed under circumstances representative of the facility's normal process and operating conditions indicate emissions in excess of the applicable standards, then:

(i) within thirty (30) days following receipt of such test results, the licensee shall re-test the non-complying emission source under circumstances representative of the facility's normal process and operating conditions and in accordance with the Department's air emission compliance test protocol and 40 CFR Part 60 or other method approved or required by the Department; and

(ii) the days of violation shall be presumed to include the date of stack test and each and every day of operation thereafter until compliance is demonstrated under normal and representative process and operating conditions, except to the extent that the facility can prove to the satisfaction of the Department that there were intervening days during which no violation occurred or that the violation was not continuing in nature; and

(iii) the licensee may, upon the approval of the Department following the successful demonstration of compliance at alternative load conditions, operate under such alternative load conditions on an interim basis prior to a demonstration of compliance under normal and representative process and operating conditions.

(13) Notwithstanding any other provisions in the State Implementation Plan approved by the EPA or Section 114(a) of the CAA, any credible evidence may be used for the purpose of establishing whether a person has violated or is in violation of any statute, regulation, or Part 70 license requirement.

(14) The licensee shall maintain records of malfunctions, failures, downtime, and any other similar change in operation of air pollution control systems or the emissions unit itself that would affect emission and that is not consistent with the terms and conditions of the air emission license. The licensee shall notify the Department within two (2) days or the next state working day, whichever is later, of such occasions where such changes result in an increase of emissions. The licensee shall report all excess emissions in the units of the applicable emission limitation.

(15) Upon written request from the Department, the licensee shall establish and maintain such records, make such reports, install, use and maintain such monitoring equipment, sample such emissions (in accordance with such methods, at such locations, at such intervals, and in such a manner as the Department shall prescribe), and provide other information as the Department may reasonably require to determine the licensee's compliance status.

## SPECIAL CONDITIONS

(16) Boilers

A. NASB shall be limited to the firing of #2 fuel oil, #1 kerosene, and/or natural gas, none with a sulfur content to exceed 0.5% by weight, in the boilers listed below. Boilers #3, #4 and #5 in building 211 shall also be permitted to fire specification waste oil with a maximum sulfur content not to exceed 0.5% by weight.

B. Emissions from the boilers at NASB shall each be limited to the following:

| **Equipment** | | **PM** | **$PM_{10}$** | **$SO_2$** | **$NO_x$** | **CO** | **VOC** |
|---|---|---|---|---|---|---|---|
| **Hangar 1** | | | | | | | |
| Boiler #1 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.66 | 0.66 | 2.8 | 2.0 | 0.22 | 0.06 |
| Boiler #2 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.66 | 0.66 | 2.8 | 2.0 | 0.22 | 0.06 |
| Boiler #3 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.66 | 0.66 | 2.8 | 2.0 | 0.22 | 0.06 |
| **Hangar 3** | | | | | | | |
| Boiler #1 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.63 | 0.63 | 2.6 | 1.9 | 0.21 | 0.05 |
| Boiler #2 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.63 | 0.63 | 2.6 | 1.9 | 0.21 | 0.05 |
| Boiler #3 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.63 | 0.63 | 2.6 | 1.9 | 0.21 | 0.05 |
| **Bldg. 86** | | | | | | | |
| Boiler #1 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.36 | 0.36 | 1.5 | 1.1 | 0.12 | 0.03 |
| Boiler #2 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.36 | 0.36 | 1.5 | 1.1 | 0.12 | 0.03 |
| Boiler #3 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.36 | 0.36 | 1.5 | 1.1 | 0.12 | 0.03 |
| **Bldg. 250** | | | | | | | |
| Boiler #1 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.72 | 0.72 | 3.0 | 2.2 | 0.24 | 0.06 |
| Boiler #2 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.72 | 0.72 | 3.0 | 2.2 | 0.24 | 0.06 |
| Boiler #3 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.72 | 0.72 | 3.0 | 2.2 | 0.24 | 0.06 |
| Make-up air | lb/hr | 0.33 | 0.33 | 1.4 | 1.0 | 0.11 | 0.03 |
| **Bldg. 211** | | | | | | | |
| Boiler #3 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.66 | 0.66 | 2.8 | 2.0 | 0.22 | 0.06 |
| Boiler #4 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.74 | 0.74 | 3.1 | 2.2 | 0.25 | 0.06 |
| Boiler #5 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.74 | 0.74 | 3.1 | 2.2 | 0.25 | 0.06 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| **Bldg. 594** | | | | | | | |
| Boiler #1 | lb/hr | 0.18 | 0.18 | 0.75 | 0.52 | 0.04 | 0.02 |
| Boiler #2 | lb/hr | 0.18 | 0.18 | 0.75 | 0.52 | 0.04 | 0.02 |
| **Bldg. 516** | lb/hr | 0.19 | 0.19 | 0.81 | 0.55 | 0.05 | 0.02 |
| **Bldg. 54** | lb/hr | 0.26 | 0.26 | 1.1 | 0.77 | 0.07 | 0.02 |
| **Bldg. 645** | lb/hr | 0.20 | 0.20 | 0.87 | 0.60 | 0.05 | 0.02 |
| **Hangar 5** | | | | | | | |
| Boiler #1 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.51 | 0.51 | 2.1 | 1.5 | 0.17 | 0.04 |
| Boiler #2 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.51 | 0.51 | 2.1 | 1.5 | 0.17 | 0.04 |
| Boiler #3 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.51 | 0.51 | 2.1 | 1.5 | 0.17 | 0.04 |
| Boiler #4 | lb/MMBtu | 0.12 | 0.12 | - | - | - | - |
| | lb/hr | 0.51 | 0.51 | 2.1 | 1.5 | 0.17 | 0.04 |
| **Bldg. 512** | | | | | | | |
| Boiler #1 | lb/hr | 0.16 | 0.16 | 0.66 | 0.46 | 0.04 | 0.01 |
| Boiler #2 | lb/hr | 0.14 | 0.14 | 0.61 | 0.43 | 0.05 | 0.01 |
| Boiler #3 | lb/hr | 0.14 | 0.14 | 0.61 | 0.43 | 0.05 | 0.01 |

C. Visible emissions from all of the boilers listed above shall each not exceed 20% opacity based on a six (6) minute block average basis.

D. NASB shall be limited to an annual fuel consumption limit of 2,500,000 gallons of fuel oil, and/or the equivalent 339.9 million scf of natural gas (based on a 12 month rolling total).

(17) Diesel Generators

A. NASB shall be limited to the firing of low sulfur diesel fuel with a sulfur content to exceed 0.05% by weight, in the generators listed below, with the exception of engine #14 in building 233 which shall be limited to a maximum sulfur content not to exceed 0.5% by weight.

B. Emissions from the generators at NASB shall each be limited to the following:

| **Equipment** | | **PM** | **$PM_{10}$** | **$SO_2$** | **$NO_x$** | **CO** | **VOC** |
|---|---|---|---|---|---|---|---|
| **Bldg. 233** | | | | | | | |
| Engine #14 | lb/MMBtu | 0.20 | 0.20 | 0.50 | 3.1 | 0.81 | 0.10 |
| | lb/hr | 1.8 | 1.8 | 4.4 | 27.3 | 7.1 | 0.88 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| **Hangar 5** | | | | | | | |
| Engine #3 | lb/hr | 0.18 | 0.18 | 0.08 | 6.6 | 1.4 | 0.53 |
| **Bldg. 86** | | | | | | | |
| Engine #31 | lb/hr | 0.09 | 0.09 | 0.04 | 3.4 | 0.74 | 0.27 |
| **Bldg. 200** | | | | | | | |
| Engine #4 | lb/MMBtu | 0.12 | - | - | - | - | - |
| | lb/hr | 0.25 | 0.25 | 0.11 | 9.3 | 2.0 | 0.74 |
| **Bldg. 209** | | | | | | | |
| Engine #8 | lb/hr | 0.23 | 0.23 | 0.10 | 8.6 | 1.9 | 0.68 |
| **Bldg. 211** | | | | | | | |
| Engine #9 | lb/hr | 0.08 | 0.08 | 0.03 | 2.8 | 0.60 | 0.22 |
| **Bldg. 292** | | | | | | | |
| Engine #5 | lb/hr | 0.15 | 0.15 | 0.06 | 5.4 | 1.2 | 0.43 |
| **Bldg. 225** | | | | | | | |
| Engine #38 | lb/hr | 0.15 | 0.15 | 0.06 | 5.4 | 1.2 | 0.43 |
| **Bldg. 295** | | | | | | | |
| Engine #18-1 | lb/hr | 0.34 | 0.34 | 0.14 | 12.3 | 2.7 | 0.98 |
| Engine #18-2 | lb/hr | 0.34 | 0.34 | 0.14 | 12.3 | 2.7 | 0.98 |
| Engine #18-3 | lb/hr | 0.34 | 0.34 | 0.14 | 12.3 | 2.7 | 0.98 |
| Engine #18-4 | lb/hr | 0.34 | 0.34 | 0.14 | 12.3 | 2.7 | 0.98 |
| **Bldg. 594** | | | | | | | |
| Engine #26 | lb/hr | 0.35 | 0.35 | 0.15 | 12.8 | 2.8 | 1.1 |
| Engine #27 | lb/hr | 0.26 | 0.26 | 0.11 | 9.7 | 2.1 | 0.77 |
| **Bldg. 645** | | | | | | | |
| Engine #29 | lb/hr | 0.32 | 0.32 | 0.14 | 11.9 | 2.6 | 0.95 |
| **Bldg. 646** | | | | | | | |
| Engine #30 | lb/hr | 0.12 | 0.12 | 0.05 | 4.3 | 0.93 | 0.34 |
| **Bldg. 654** | | | | | | | |
| Engine #32 | lb/hr | 0.15 | 0.15 | 0.06 | 5.4 | 1.2 | 0.43 |
| In storage Engine #44 | lb/hr | 0.07 | 0.07 | 0.03 | 2.6 | 0.55 | 0.20 |

C. Visible emissions from all of the generators listed above shall each not exceed 30% opacity based on a six (6) minute block average basis, except for no more than two (2) six (6) minute block averages in a 3-hour period.

D. NASB shall be limited to an annual diesel fuel consumption limit of 30,000 gallons (based on a 12 month rolling total).

(18) Recordkeeping for fuel burning and generator equipment

NASB shall maintain the following records on a monthly basis:

A. all fuel oil, kerosene and/or natural gas delivered to the facility to include quantity and sulfur content of each shipment;

B. all specification waste oil fired in the building 211 boilers to include quantity, type and sulfur content;

C. all diesel fuel delivered to the generators to include quantity and sulfur content of each shipment. NASB shall also document the hours of operation for each generator unit.

(19) Process Equipment

A. Storage Tanks
   1. NASB shall maintain all tanks in good working order in such a way to minimize emissions.
   2. NASB shall maintain records of monthly throughout for each non-exempt tank to include quantity and type of fuel.

B. Fuel Dispensing Operations
   1. All gasoline storage tanks located at a dispensing facility shall be equipped with a fill pipe that extends to within six (6) inches of the bottom of the tank.
   2. NASB shall maintain records of monthly throughput for each tank to include quantity and type of fuel.

C. Deicing Operations

   NASB shall maintain records on a monthly basis of all propylene glycol usage.

D. Degreasers
   1. NASB shall operate all subject degreasers according to the following standards:
      a. close cover when not in use,
      b. drain cleaned parts for 15 seconds or longer,
      c. do not degrease porous material,
      d. keep drafts across the top of the degreaser to under 40 m/min, and
      e. repair any visible solvent leaks immediately.

2. Vapor tight containers shall be used for the storage of spent or fresh solvent and for the storage or disposal of cloth or paper impregnated with VOC containing substances used for surface preparation or cleaning.
3. NASB shall maintain monthly records of all solvent that is added or removed.

E. Painting Operations
1. NASB shall ensure that all coatings containing VOCs are stored in vapor tight containers to minimize the chance of spills and emissions.
2. NASB shall maintain all fabric filters in good working order to minimize emissions from the paint booths.
3. NASB maintain monthly records of material and usage amount along with VOC content (as documented by MSDS sheets) per month for each of these units to document the quantity of VOC emissions, as well as maintaining records of miscellaneous paint usage at the facility.

F. Jet Engine Test Cells
NASB shall maintain monthly records of usage for the small and large engine test cells to be used to document emissions from these units. These records shall also contain the emission factors used to determine the emissions of all regulated pollutants.

G. Miscellaneous Fugitive Emissions
NASB shall maintain monthly records of all miscellaneous fugitive emissions from each of the squadrons and other satellite work areas such as painting and surface cleaning operations.

(20) VOC Emissions

A. Total VOC emissions from the facility shall not exceed 48.0 tons per year (based on a 12 month rolling total).

B. NASB shall maintain records of all VOC emissions from the facility to demonstrate compliance with this limit.

(21) Visible Emissions

A. Visible emissions from all of the boilers listed above in condition (16) shall each not exceed 20% opacity based on a six (6) minute block average basis.

B. Visible emissions from all of the generators listed above in condition (17) shall each not exceed 30% opacity based on a six (6) minute block average basis, except for no more than two (2) six (6) minute block averages in a 3-hour period.

C. Visible emissions from all process equipment shall not exceed 20% opacity based on a six (6) minute block average basis.

(22) The term of this license shall be five (5) years from the signature date below.

DONE AND DATED IN AUGUSTA, MAINE THIS DAY OF 2000.

DEPARTMENT OF ENVIRONMENTAL PROTECTION

BY:_____
MARTHA G. KIRKPATRICK, COMMISSIONER

PLEASE NOTE ATTACHED SHEET FOR GUIDANCE ON APPEAL PROCEDURES

Date of initial receipt of application: December 6, 1999
Date of application acceptance: December 6, 1999

Date filed with the Board of Environmental Protection: _____

This Order prepared by Stephanie L. Carver, Bureau of Air Quality